

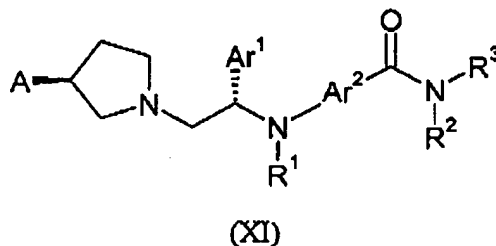
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Amendments to the Claims:

1. (Currently Amended) A ~~single step or multi step~~ process for the preparation of a compound of formula (XI):



or a stereoisomer thereof, wherein;

A is hydrogen, hydroxy, C₁-C₆ (~~preferably C₁-C₄~~) alkyl, C₁-C₆ (~~preferably C₁-C₄~~) fluoroalkyl (~~particularly CF₃~~), C₁-C₆ (~~preferably C₁-C₄~~) alkoxy, or OY wherein Y is a hydroxy protecting group or A, taken together with its geminal hydrogen, is an oxo group;

Ar¹ is phenyl optionally substituted by one or more (~~preferably one to two~~) substituents selected from fluoro, C₁-C₄ alkyl, C₁-C₄ alkoxy, C₁-C₄ alkoxy-C₁-C₄ alkoxy, trifluoromethyl, carboxy-C₁-C₄ alkoxy and C₁-C₄ alkoxycarbonyl-C₁-C₄ alkoxy;

Ar² is phenyl, naphthyl, pyridyl, thienyl, furyl, pyrrolyl or pyrimidyl, each being optionally substituted by one or more (~~preferably one to two~~) substituents selected from fluoro, C₁-C₄ alkyl, C₁-C₄ alkoxy, di(C₁-C₄)alkylamino and C₁-C₄ fluoroalkyl;

R¹ is C₁-C₆ alkyl or benzyl wherein the phenyl moiety of said benzyl is optionally substituted with C₁-C₆ alkoxy or OY wherein Y is a hydroxy protecting group; and

R² and R³ are independently selected from hydrogen, C₁-C₇ alkyl optionally substituted by one or more (~~preferably one to five~~) hydroxy or halo groups, C₃-C₆ cycloalkyl, C₂-C₆

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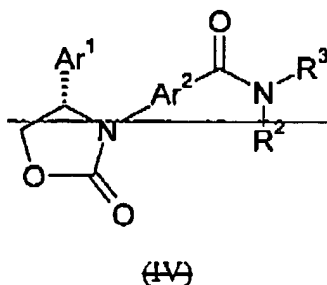
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alkenyl, C₂-C₆ alkynyl, C₁-C₇ (preferably C₁-C₅)-alkoxy, phenyl optionally substituted by fluoro (preferably substituted by one or two fluoro groups), phenyl-C₁-C₇ (preferably C₁-C₅)-alkyl wherein the phenyl group is optionally substituted by fluoro, and - (CH₂)_nX-R⁴ wherein n is one or two, X is O or S and R⁴ is C₁-C₃ alkyl, or, when Ar² is phenyl, -Ar²-C(=O)-N(R²)- is a phthalimide group and R³ is C₁-C₇ alkyl; or

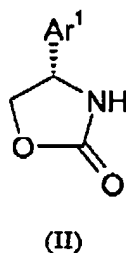
R² and R³, together with the nitrogen atom to which they are attached, form a pyrrolidine, piperidine or morpholine ring, optionally substituted by C₁-C₃ alkyl or fluoro;

comprising a step in which the N-Ar² bond is constructed by a copper-mediated aryl amination.

2. (Currently Amended) A process as claimed in claim 1 wherein the copper-mediated aryl amination is carried out by a compound of formula (IV);



~~or the enantiomer thereof, wherein Ar¹, Ar², R² and R³ are as defined in claim 1, is prepared by treating a compound of formula (II):~~

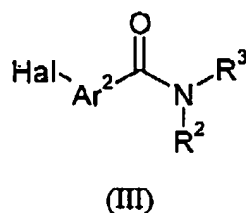


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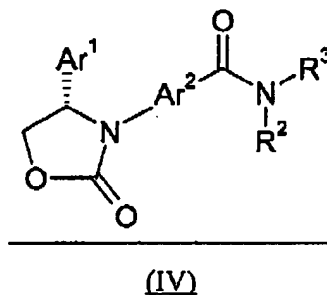
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or the enantiomer thereof, wherein Ar^1 is as defined in claim 1, with a compound of formula (III):



wherein Ar^2 , R^2 and R^3 are as defined in claim 1 and wherein one unsubstituted position on the Ar^2 moiety is substituted with a halogen group Hal, preferably Cl, Br or I, most preferably Br, in the presence of a cuprous salt, an amino ligand and a base to give a compound of formula (IV)



or the enantiomer thereof, wherein Ar^1 , Ar^2 , R^2 and R^3 are as defined in claim 1.

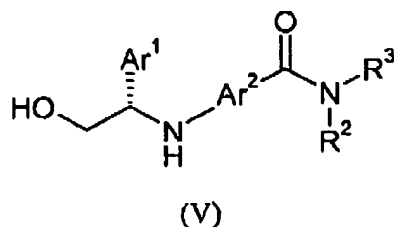
3. (Original) A process as claimed in claim 2 wherein the cuprous salt is CuI, CuBr or CuCl.
4. (Original) A process as claimed in claim 2 wherein the amino ligand is 1,2-diaminocyclohexane.
5. (Original) A process as claimed in claim 2 wherein the base is sodium carbonate, potassium carbonate or cesium carbonate.

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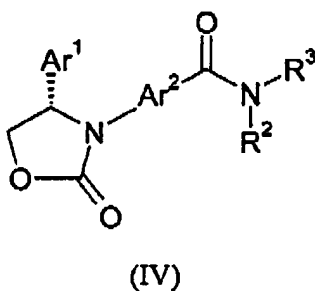
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6. (Currently Amended) A process as claimed in claim ~~1~~2 wherein a compound of formula (V):

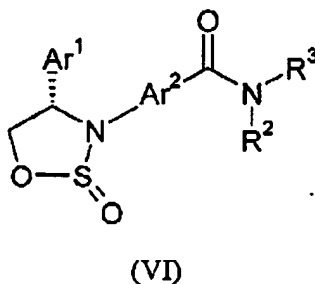


or the enantiomer thereof, wherein Ar¹, Ar², R² and R³ are as defined in claim 1, is prepared by treating a compound of formula (IV):



or the enantiomer thereof, wherein Ar¹, Ar², R² and R³ are as defined in claim 1, with a base in the presence of water.

7. (Currently Amended) A process as claimed in claim ~~4~~6 wherein a compound of formula (VI):

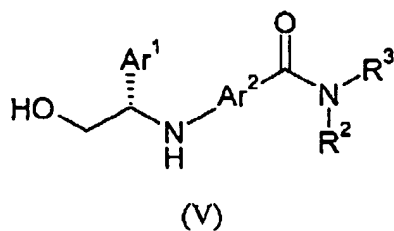


wherein Ar¹, Ar², R² and R³ are as defined in claim 1, or the enantiomer thereof, is prepared by treating a compound of formula (V):

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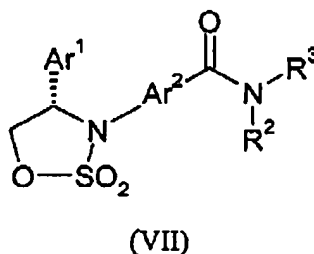
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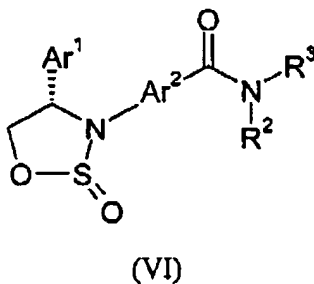


or the enantiomer thereof, wherein Ar¹, Ar², R² and R³ are as defined in claim 1, with a thionyl halide.

8. (Currently Amended) A process as claimed in claim +7 wherein a compound of formula (VII):



wherein Ar¹, Ar², R² and R³ are as defined in claim 1, or the enantiomer thereof, is prepared by oxidising a compound of formula (VI):



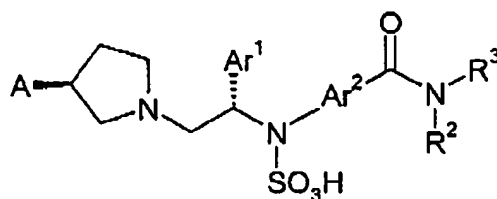
wherein Ar¹, Ar², R² and R³ are as defined in claim 1, or the enantiomer thereof.

9. (Currently Amended) A process as claimed in claim +8 wherein a compound of formula (IX):

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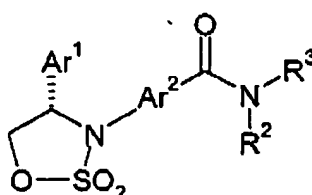
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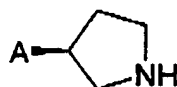
(IX)

wherein A, Ar¹, Ar², R² and R³ are as defined in claim 1, or a zwitterion thereof, or a stereoisomer of either, is prepared by treating a compound of formula (VII):



(VII)

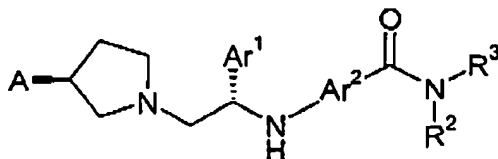
wherein Ar¹, Ar², R² and R³ are as defined in claim 1, or the enantiomer thereof, with a compound of formula (VIII):



(VIII)

wherein A is as defined in claim 1, or the enantiomer thereof.

10. (Currently Amended) A process as claimed in claim 19 wherein a compound of formula (X):



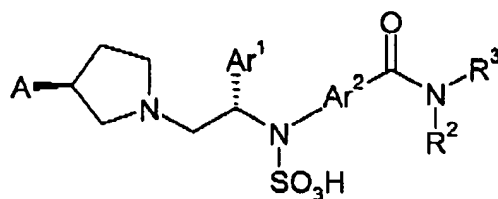
(X)

wherein A, Ar¹, Ar², R² and R³ are as defined in claim 1, or a stereoisomer thereof is prepared by hydrolytically cleaving the -SO₃H group in a compound of formula (IX):

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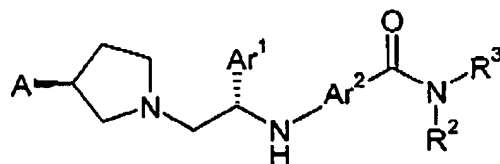
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(IX)

wherein A, Ar¹, Ar², R² and R³ are as defined in claim 1, or a zwitterion thereof, or a stereoisomer of either.

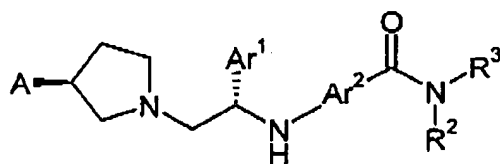
11. (Currently Amended) A process as claimed in claim ~~10~~ wherein a compound of the formula (XI), as defined in claim 1, or a stereoisomer thereof, is prepared by the reductive alkylation of a compound of formula (X):



(X)

wherein A, Ar¹, Ar², R² and R³ are as defined above, or a stereoisomer thereof.

12. (Currently Amended) A process for the preparation of a compound of formula (XI), as defined in claim 1, or a stereoisomer thereof, comprising the reductive alkylation amination of a compound of formula (X):



(X)

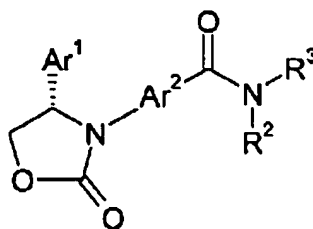
or a stereoisomer thereof, wherein A, Ar¹, Ar², R² and R³ are as defined in claim 1.

13. (Original) A process for the preparation of a compound of formula (IV):

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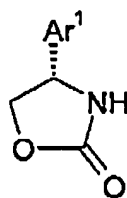
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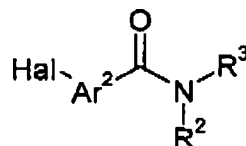
(IV)

or the enantiomer thereof, wherein Ar^1 , Ar^2 , R^2 and R^3 are as defined in claim 1, comprising treating a compound of formula (II):



(II)

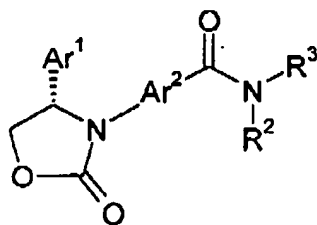
or the enantiomer thereof, wherein Ar^1 is as defined in claim 1, with a compound of formula (III):



(III)

wherein Ar^2 , R^2 and R^3 are as defined in claim 1 and wherein one unsubstituted position on the Ar^2 moiety is substituted with a halogen group Hal, preferably Cl, Br or I, most preferably Br, in the presence of a cuprous salt, an amino ligand and a base.

14. (Original) A compound of formula:



(IV)

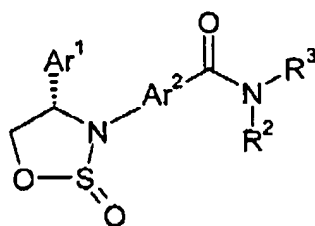
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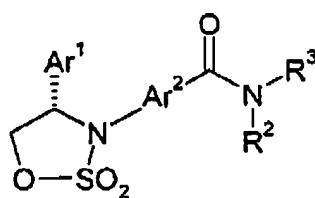
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(VI)

or



(VII)

wherein Ar^1 , Ar^2 , R^2 and R^3 are as defined in claim 1.